

**AMENDMENTS TO THE CLAIMS:**

The following is a complete listing of the claims:

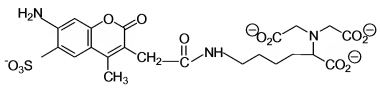
1. (currently amended) A staining solution for detecting fusion proteins comprising ~~[[an]] a poly-histidine, poly-arginine or Glu-Glu~~ affinity tag, wherein said staining solution comprises:
  - a) a fluorescent compound capable of selectively binding, directly or indirectly, to said ~~poly-histidine, poly-arginine or Glu-Glu~~ affinity tag, wherein said fluorescent compound comprises a fluorophore; and,
  - b) a buffer;with the proviso that the fluorescent compound does not comprise an antibody or fragment thereof.
2. (currently amended) The staining solution according to Claim 1, wherein said fluorescent compound is capable of selectively binding to a poly-histidine, ~~GST, poly-arginine or Glu-Glu~~ affinity tag~~[[s]]~~.
3. (currently amended) The staining solution according to Claim 1, wherein said fluorescent compound is according to formula  $A(L)_m(B)_n$  wherein A is ~~[[a]]the~~ fluorophore, L is a linker, B is binding domain, m is an integer from 1 to 4 and n is an integer from 1 to 6.
4. (original) The staining solution according to Claim 3, wherein said fluorophore is selected from the group consisting of xanthene, coumarin, cyanine, acridine, anthracene, benzofuran, indole and borapolyazaindacene.
5. (currently amended) The staining solution according to Claim 4, wherein said ~~fluorescent compound comprises glutathione as a binding domain and~~ fluorophore is xanthene ~~as a fluorophore~~.

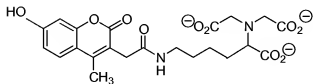
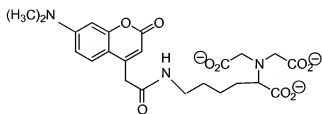
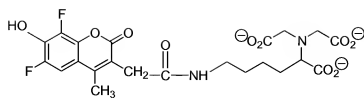
6. (currently amended) The staining solution according to Claim 4, wherein said binding domain ~~[[is an]]~~ comprises at least one acetic acid ~~group~~binding domain.
7. (currently amended) The staining solution according to Claim 6, wherein said acetic acid ~~group~~ binding domain is capable of selectively binding, directly or indirectly, to a poly-histidine or a poly-arginine affinity tag.
- 8-35. (canceled)
36. (currently amended) A kit for detecting an affinity tag containing fusion protein, wherein said kit comprises;  
a staining solution comprising a buffer and a fluorescent compound capable of selectively binding, directly or indirectly, to an affinity tag, wherein the fluorescent compound comprises a fluorophore; with the proviso that the fluorescent compound does not comprise an antibody or fragment thereof; and  
instructions for the detection of an affinity tag containing fusion protein.
37. (original) The kit according to Claim 36, wherein said kit further comprises, alone or in combination, molecular weight markers, fixing solution, wash solution and an additional detection reagent.
38. (original) The kit according to Claim 36, wherein said additional detection reagent is a total protein stain.
39. (currently amended) The kit according to Claim 36, wherein said fluorescent compound comprises a binding domain; and ~~[[a]]~~the fluorophore selected from the group consisting of a xanthene, cyanine,

coumarin, acridine, anthracene, benzofuran, borapolyazaindacene and derivative thereof.

40. (currently amended) The kit according to Claim 39, wherein said fluorescent compound is according to formula  $A(L)m(B)n$  wherein A is the[[a]] fluorophore, L is a linker, ~~B is an acetic acid binding domain~~, m is an integer from about 1 to 4 and n is an integer from about 1 to 6 and wherein said fluorescent compound comprises B is a binding domain comprising at least three acetic acid groups.
41. (original) The kit according to Claim 40 wherein said buffer has a pH between about 5 to about 6.9 and said buffer optionally comprises a metal ion selected from the group consisting of nickel and cobalt.
42. (original) The kit according to Claim 39, wherein said binding domain is glutathione.
- 43-47. (canceled)
48. (original) A composition comprising;
- a) a fluorescent compound capable of selectively binding, directly or indirectly, to affinity tag containing fusion protein, wherein said fluorescent compound comprises a fluorophore; and,
  - b) a fusion protein comprising an affinity tag, provided said fluorescent compound does not comprise an antibody or fragment thereof.
49. (currently amended) The composition according to Claim 48, wherein said fluorescent compound comprises a binding domain and [[a]]the fluorophore is selected from the group consisting of xanthene, cyanine, coumarin, acridine, anthracene, benzofuran, borapolyazaindacene and derivative thereof.

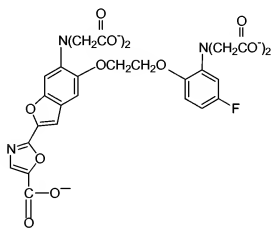
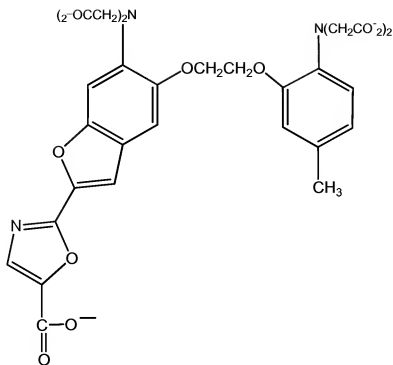
50. (currently amended) The composition according to Claim 49 wherein said fluorescent compound is according to formula A(L)<sub>m</sub>(B)<sub>n</sub> wherein A is the[[a]] fluorophore , L is a linker, B is an ~~acetic acid~~ binding domain comprising~~wherein said compound comprises~~ at least three acetic acid groups that are capable of selectively binding to a poly-histidine affinity tag, m is an integer from 1 to 4 and n is an integer from 1 to 6.
51. (original) The composition according to Claim 50, wherein said composition further comprises a metal ion selected from the group consisting of nickel and cobalt.
52. (original) The composition according to Claim 49, wherein said binding domain is glutathione.
53. (new) A staining solution for detecting fusion proteins comprising an affinity tag, wherein said staining solution comprises:
- a fluorescent compound capable of selectively binding, directly or indirectly, to said affinity tag, wherein said fluorescent compound comprises a fluorophore; and
  - a buffer comprising a metal ion;
- with the proviso that the fluorescent compound does not comprise an antibody or fragment thereof.
54. (new) The staining solution according to any one of Claims 1, 36 or 53 wherein said fluorophore is a coumarin and said compound is selected from the group consisting of

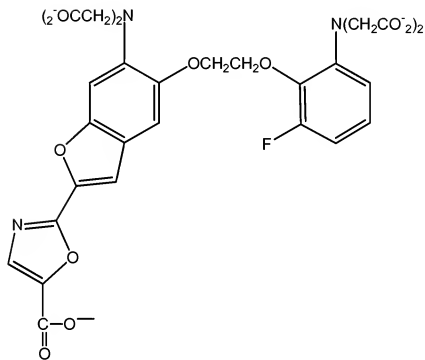
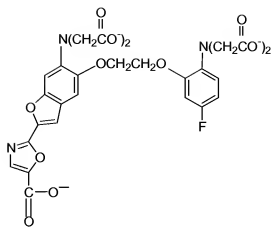


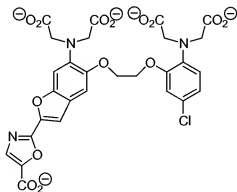
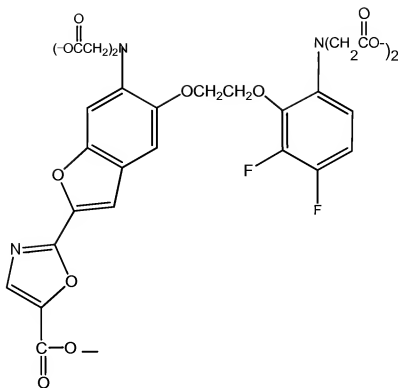


and salts thereof.

55. (new) The staining solution according to any one of Claims 1, 36 or 53 wherein said fluorophore is a benzofuran and said compound is selected from the group consisting of

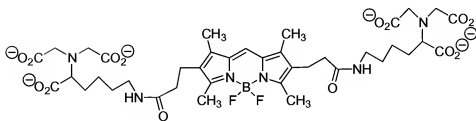
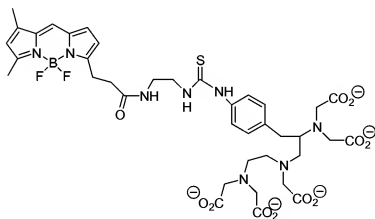
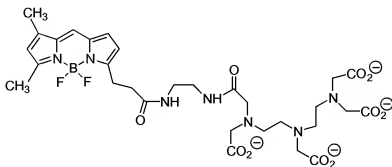
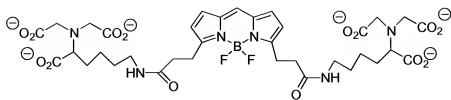


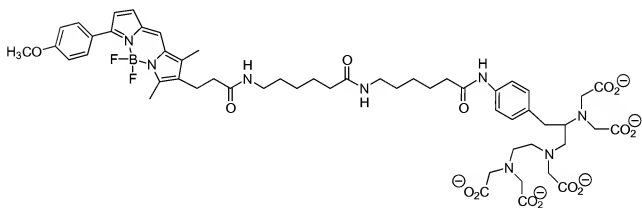
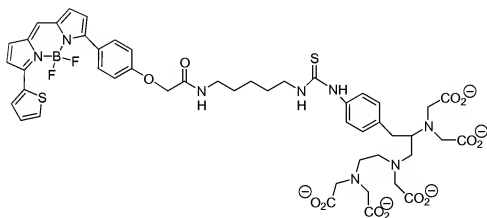
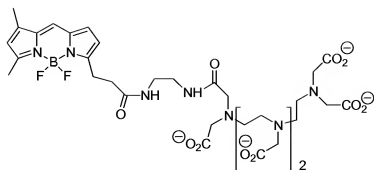


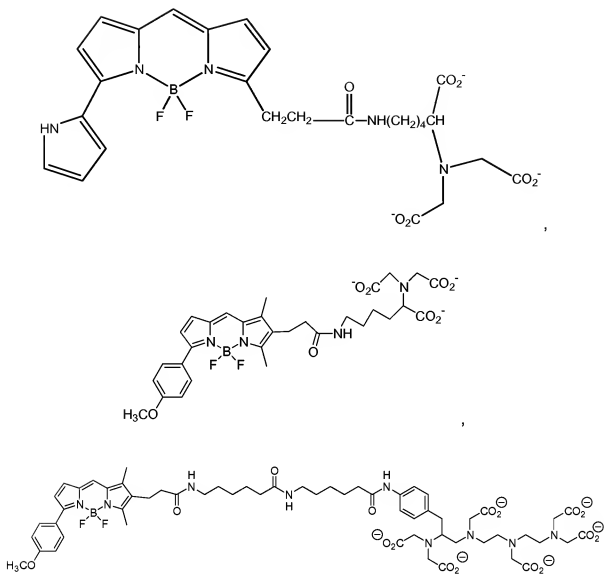


and salts thereof.

56. (new) The staining solution according to any one of Claims 1, 36, or 53 wherein said fluorophore is a borapolyazaindacene and said compound is selected from the group consisting of







and salts thereof.